

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization International Bureau



(43) International Publication Date
6 October 2005 (06.10.2005)

PCT

(10) International Publication Number
WO 2005/093079 A1

(51) International Patent Classification⁷: C12N 15/86, 15/85, 15/87

(21) International Application Number: PCT/US2005/009238

(22) International Filing Date: 21 March 2005 (21.03.2005)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data: 60/555,177 22 March 2004 (22.03.2004) US

(71) Applicant (for all designated States except US): THE OHIO STATE UNIVERSITY RESEARCH FOUNDATION [US/US]; 200 Research Foundation, 1960 Kenny Road, Columbus, OH 43210 (US).

(72) Inventors; and

(75) Inventors/Applicants (for US only): CALIGIURI, Michael, A. [US/US]; 2464 Wenbury Road, Columbus, OH 43220 (US). TROTTA, Rossana [IT/US]; 4739 Bridle Path Court, Dublin, OH 43017 (US). YU, Jianhua [CN/US]; 548 Stinchcomb Drive, Apt.#4, Columbus, OH 43202 (US). BECKNELL, Brian [US/US]; 4288 Bitterroot Drive, Westerville, OH 43081 (US).

(74) Agent: MYERS-PAYNE, Sean, C.; Calfee, Halter & Griswold, LLP, 1100 Fifth Third Center, 21 East State Street, Columbus, OH 43215 (US).

(81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AI, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SI, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

- with international search report
- before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

WO 2005/093079 A1

(54) Title: METHODS FOR TRANSFECTING NATURAL KILLER CELLS

(57) Abstract: Methods for stably transfecting mammalian natural killer cells comprising: transfecting a packaging cell line with a retroviral expression vector; culturing the transfected packaging cell line in a cell culture medium; and culturing the mammalian natural killer cells with the cell culture medium. Natural killer cells transfected according to the disclosed methods are also provided.